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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/660,213	09/11/2003	Darren T. Sapshe	CM06328J	6551
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MOTOROLA, INC 1303 EAST ALGONQUIN ROAD IL01/3RD SCHAUMBURG, IL 60196			EXAMINER FAULK, DEVONAE	
			ART UNIT 2615	PAPER NUMBER
			NOTIFICATION DATE 04/23/2008	DELIVERY MODE ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

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Office Action Summary

Application No.

10/660,213

Applicant(s)

SAPASHE ET AL.

Examiner

DEVONA E. FAULK

Art Unit

2615

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 11 February 2008.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-3 and 5 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-3 and 5 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 11 September 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/S508)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date _____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____

DETAILED ACTION

Response to Arguments

1. Applicant's arguments, regarding the newly recited claim language, filed 2/11/08, with respect to the rejection(s) of claim(s) 1-3 and 5 under 103(a) have been fully considered and are persuasive. Therefore, the rejection has been withdrawn. However, upon further consideration, a new ground(s) of rejection is made in view of 112 1st new matter rejection. .
2. Applicant's arguments filed 2/11/08 have been fully considered but they are not persuasive with regards to prior art Cooper. The applicant asserts that the prior art Cooper fails to disclose switchably engaging a microphone. The examiner noted in the previous office action that the examiner was interpreting switchably engaged as selectively engaged. The examiner asserts that Cooper teaches of selectively engaging a microphone (column 4, lines 21-32). Cooper teaches of sampling of ambient noise via a digital microphone. Sampling means that the microphone is selectively engaged and therefore Cooper reads on the language as recited. Furthermore, Cooper reads on the amended claim language because the sampling is of ambient noise.
3. Claim 4 is cancelled.

Claim Objections

4. Claims 1-3 and 5 objected to because of the following informalities: Claims 1-3 and 5 recite "...monitoring only background noise levels...: " or "... monitoring subsequent background audio level alone". The specification (see page 4, lines 12-19) discloses

monitoring background noise levels and not monitoring only background noise levels.

The examiner has therefore interpreted the claims as "monitoring subsequent background audio levels" as was previously recited. Appropriate correction is required.

Specification

5. The specification is objected to as failing to provide proper antecedent basis for the claimed subject matter. See 37 CFR 1.75(d)(1) and MPEP § 608.01(o). Correction of the following is required: Claims 1-3 and 5 recite "...monitoring only background noise levels...: " or "... monitoring subsequent background audio level alone". The specification lacks antecedent basis for the claimed subject matter.

Claim Rejections - 35 USC § 112

6. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

7. Claims 1-3 and 5 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention. Claims 1-3 and 5 recite "...monitoring **only** background noise levels...: " or "... monitoring subsequent background audio level **alone**". The specification discloses, on page 4, lines 12-19 that "When a subsequent change to the user's manual volume control 212 is sensed by the intelligent AVC 208, the AVC 208 causes the audio environment to be sampled via a microphone 214 via

switch 216 and analog to digital converter 218." This does not read on monitoring alone or monitoring only the background audio level.

Claim Rejections - 35 USC § 103

8. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

9. **Claim 1-3 and 5** are rejected under 35 U.S.C. 103(a) as being unpatentable over Helms (US 5,666,426) in view of Cooper (US 5,790,671).

Regarding **claim 1**, Helms discloses a method for controlling volume in a communication device, comprising:

Detecting a change in manual volume setting (Figure 2, at step 50);

Measuring current background audio level (Figure 2 at step 32);

Determining a relationship between the current background audio level and the volume setting (Figure 2; column 3, lines 19-64);

Establishing the relationship as a desired volume level to be maintained (Figure 2; column 3, lines 19-64);

Sensing a subsequent change in the manual volume setting (Figure 2 at step 50);

Monitoring subsequent background audio level by engaging a microphone of the communication device in response to the subsequent change in the manual volume setting (column 3, lines 19-64; column 4, lines 1-28 and lines 43-55);

Comparing the current background level to the subsequent background level; (Figure 2 at step 44; column 4, lines 1-35)

Determining whether a change in background level occurred (Figure 2 at step 46; column 4, lines 30-33); and

Automatically adjusting volume of a speaker based on the relationship (column 4, lines 1-58; Figure 2).

Helms discloses a communication device, for example a car stereo. Helms fails to disclose a two-way communication device. The examiner takes official notice that two-way radios are known in the art and that volume control is used in various devices. It would have been obvious to modify Helms so that the communication device is a two-way radio for the benefit of providing automatic volume control as taught by Helms to two-way radios.

Helms as modified discloses engaging a microphone of the communication device in response to the subsequent change in the manual volume setting.

Helms fails to disclose switchably engaging a microphone. The examiner has interpreted this as selectively engaging a microphone. Cooper discloses selectively engaging a microphone column 4, lines 21-32). It would have been obvious to modify Helms to switchably or selectively engage the microphone in order to better provide improved intelligibility (Cooper, column 1, lines 33-38).

Regarding **claim 3**, Helms discloses a communication device, including:

A controller for monitoring background audio levels (DSP 16, Figure 1; (column 3, lines 15-40; column 4, lines 43-58);

A manual volume control coupled to the controller, the manual volume control setting a volume level as a user preference for a current background audio level (22, Figure 1; column 2, lines 49-51);

A microphone coupled to the controller for monitoring background noise levels in response to changes in the manual volume control (microphone 12, Figure 1); and

The controller providing automatic adjustment of the volume level based on the user preference for the current background audio level in response to any change in the monitored background audio level (column 3, lines 15-40; column 4, lines 43-58).

Helms discloses that the microphone is coupled to the controller and monitoring and monitoring background noise levels in response to changes in the manual volume (column 2, lines 49-51; column 3, lines 19-64; column 4, lines 1-28 and lines 43-55).

Helms as modified discloses engaging a microphone of the communication device in response to the subsequent change in the manual volume setting.

Helms fails to disclose switchably coupling a microphone. The examiner has interpreted this as selectively engaging a microphone. Cooper discloses selectively engaging a microphone column 4, lines 21-32). It would have been obvious to modify Helms to switchably or selectively engage the microphone in order to better provide improved intelligibility (Cooper, column 1, lines 33-38).

The method of **claim 2** is implicit in the functionality of the communication device of claim 3. Claim 2 is rejected using Helms and Cooper as applied above to the rejection of claim 3.

Regarding **claim 5**, Helms discloses a communication device, comprising:

A controller having an intelligent automatic volume control (AVC) for determining when to sample an audio environment (DSP 16, Figure 1; (column 3, lines 15-40; column 4, lines 43-58);

A manual volume control coupled to the controller, the manual volume control establishing a user selected preferred volume level for an initial background audio level (22, Figure 1; column 2, lines 49-51);

A microphone coupled to the controller, the microphone sampling subsequent background audio levels in response to a subsequent change to the manual volume control being sensed by the intelligent AVC (microphone 12, Figure 1; column 2, lines 49-51; column 3, lines 19-64; column 4, lines 1-28 and lines 43-55);

A speaker coupled to the controller, the speaker having a volume level automatically adjusted by the controller based on the initial background audio level, the sampled subsequent background audio level and the user preferred volume level for the initial background audio level thereby maintaining a user established relationship between the volume heard at the speaker and the sampled subsequent background (20, Figure 1; column 2, line 63-column 4, line 57; column 5, lines 21-26)

Helms discloses a communication device, for example a car stereo. Helms fails to disclose a two-way communication device. The examiner takes official notice that

two-way radios and transceivers are known in the art and that volume control is used in various devices. It would have been obvious to modify Helms so that the communication device is a two-way radio for the benefit of providing automatic volume control as taught by Helms to two-way radios.

Helms as modified discloses engaging a microphone of the communication device in response to the subsequent change in the manual volume setting.

Helms fails to disclose switchably coupling a microphone and an AVC engaging the microphone (Figure 1; 20 reads on AVC; column 3, lines 41-50). The examiner has interpreted this as selectively engaging a microphone. Cooper discloses selectively engaging a microphone (column 4, lines 21-32). It would have been obvious to modify Helms to switchably or selectively engage the microphone in order to better provide improved intelligibility (Cooper, column 1, lines 33-38).

Conclusion

8. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of

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the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Devona E. Faulk whose telephone number is 571-272-7515. The examiner can normally be reached on 8 am - 5 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Vivian Chin can be reached on 571-272-7848. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Devona E. Faulk/

Examiner, Art Unit 2615

/Vivian Chin/

Supervisory Patent Examiner, Art Unit 2615